Comparisons of Job Characteristics

Focus Occupation: Electrical Engineers (17-2071)

Associated Occupation: Electrical and Electronics Drafters (17-3012)

3.9

Compare Knowledge
Compare Skills
Compare Abilities
Compare Detailed Work Activities
Compare Tools and Technologies

<<	Focus occupation element is much lower
<	Focus occupation element is lower
0	Focus occupation element is at a similar level
>	Focus occupation element is at a higher level
>>	Focus occupation element is at a much higher level

Current knowledge level is likely sufficient

Knowledge Similarity of Focus Occupation to Associated Occupation: 94 Focus Occupation: Electrical Engineers (17-2071) Associated Occupation: Electrical and Electronics Drafters (17-3012) Average **Associated Focus Associated Occupation's** Rating, All Occupation's Occupation's **Evaluation of Focus Occupation** Key Knowledge Elements Occupations Rating Rating Current knowledge level is likely more than Design 5.2 16.9 21.5 sufficient Current knowledge level is likely more than 5.7 12.7 22.4 **Engineering and Technology** sufficient

The maximum possible rating is 25.

Telecommunications

Source: Alaska Department of Labor and Workforce Development, Research and Analysis Section analysis of O*NET (Occupation Information Network) data.

6.2

7.2

Skills	Similarity of Focus Occupation to Associated Occupation: 87									
-	Focus Occupation: Electrical Engineers (17-2071) Associated Occupation: Electrical and Electronics Drafters (17-3012)									
Associated Occupation's Key Skills Elements	Average Rating, All Occupations	Associated Occupation's Rating	Focus Occupation's Rating	Evaluation of Focus Occupation						
Complex Problem Solving	9.1	10.2	12.5	> Skill level is likely sufficient						
Operations Analysis	5.0	8.2	9.8	Skill level is likely sufficient						

The maximum possible rating is 25.

Source: Alaska Department of Labor and Workforce Development, Research and Analysis Section analysis of O*NET (Occupation Information Network) data.

Abilities

Similarity of Focus Occupation to Associated Occupation: 95

Focus Occupation: Electrical Engineers (17-2071)

Associated Occupation: Electrical and Electronics Drafters (17-3012)

Associated Occupation's Key Abilities Elements	Average Rating, All Occupations	Associated Occupation's Rating	Focus Occupation's Rating	Evaluation of Focus Occupation	
Oral Expression	12.4	13.7	14.8	0	Current ability level may be sufficient
Oral Comprehension	12.5	13.6	14.5	0	Current ability level may be sufficient
Written Comprehension	11.0	13.1	14.8	>	Current ability level is likely sufficient
Near Vision	11.1	12.2	11.0	<	Some improvement in abilities may be required
Written Expression	9.8	12.1	13.8	>	Current ability level is likely sufficient
Information Ordering	9.9	10.7	12.3	>	Current ability level is likely sufficient
Visualization	7.5	9.9	8.1	<	Some improvement in abilities may be required

The maximum possible rating is 25.

Source: Alaska Department of Labor and Workforce Development, Research and Analysis Section analysis of O*NET (Occupation Information Network) data.

Activities that Both Occupations Have in Common

Similarity of Focus
Occupation to Associated
Occupation: 87

Focus Occupation: Electrical Engineers (17-2071)

Associated Occupation: Electrical and Electronics Drafters (17-3012)

Work Activities	Exclusivity of Activity
Analyze technical data, designs, or preliminary specifications	47
Communicate technical information	4
Conduct training for personnel	30
Confer with engineering, technical or manufacturing personnel	25
Create mathematical or statistical diagrams or charts	43
Develop plans for programs or projects	31
Direct and coordinate activities of workers or staff	3
Draw prototypes, plans, or maps to scale	57
Estimate time needed for project	64
Examine engineering documents for completeness or accuracy	62
Follow manufacturing methods or techniques	73
Prepare technical reports or related documentation	22
Read blueprints	10
Read schematics	34
Read technical drawings	7
Resolve engineering or science problems	46
Understand engineering data or reports	48
Use computer aided drafting or design software for design, drafting, modeling, or other engineering tasks	58
Use computer graphics design software	70
Use computers to enter, access or retrieve data	3
Use drafting or mechanical drawing techniques	50
Use government regulations	44
Use spreadsheet software	18
Use word processing or desktop publishing software	17

Not all positions in these occupations will necessarily perform all of the listed activities. The exclusivity rating is an indication of how unique the activity is amongst all occupations. The maximum rating is 100. High scores indicate that only a small number of occupations engage in that activity.

Source: Alaska Department of Labor and Workforce Development, Research and Analysis Section analysis of O*NET (Occupation Information Network) data.

Tools and Technologies that Both Occupations Have in Common

Similarity of Focus
Occupation to Associated
Occupation: 63

Focus Occupation: Electrical Engineers (17-2071)

Associated Occupation: Electrical and Electronics Drafters (17-3012)

Tools and Technologies	Exclusivity
Business function specific software	1
Computers	1
Content authoring and editing software	1
Industry specific software	1
Length and thickness and distance measuring instruments	2

Not all positions in these occupations will necessarily use all of the listed tools and technologies. The exclusivity rating is an indication of how unique the tool or technology is amongst all occupations. The maximum rating is 100. High scores indicate that only a small number of occupations use that tool or technology.

Source: Alaska Department of Labor and Workforce Development, Research and Analysis Section analysis of O*NET (Occupation Information Network) data.